=> s (IL-1ra or interleukin-1 receptor antagonist#)

5227 (IL-1RA OR INTERLEUKIN-1 RECEPTOR ANTAGONIST#)

=> s (IL-1ra-R or interleukin-1 receptor antagonist related)

14 (IL-1RA-R OR INTERLEUKIN-1 RECEPTOR ANTAGONIST RELATED)

=> d l2 1-12 bib ab

L2 ANSWER 1 OF 14 MEDLINE

AN 2001138840 MEDLINE

DN 21030891 PubMed ID: 11192058

TI Physical activity and plasma interleukin-6 in humans--effect of

of exercise.

AU Ostrowski K; Schjerling P; Pedersen B K

CS The Copenhagen Muscle Research Centre, Rigshospitalet Afs 7652, Denmark

SO Eur J Appl Physiol, (2000 Dec) 83 (6) 512-5.

Journal code: 100954790. ISSN: 1439-6319.

CY Germany: Germany, Federal Republic of

DT Journal; Article; (JOURNAL ARTICLE)

LA English

FS Priority Journals

EM 200103

ED Entered STN: 20010404

Last Updated on STN: 20010404

Entered Medline: 20010308

AB The present study included data from three marathon races to investigate

the hypothesis that a relationship exists between running intensity

elevated concentrations of interleukin (IL)-6 in plasma. The study included a total of 53 subjects whose mean age was 30.6 [95% confidence

interval (Cl) 1.4] years, mean body mass 77.7 (95% Cl 2.0) kg, mean

maximal oxygen uptake (VO2max) 59.3 (95% CI 1.4) ml x  $min(-1) \times kg(-1)$ 

and who had participated in the Copenhagen Marathons of 1996, 1997 or

1998, achieving a mean running time of 206 (95% CI 7) min. Running

intensity was calculated as running speed divided by VO2 max. The

concentration of IL-6 in plasma peaked immediately after the run. There

was a negative correlation between peak IL-6 concentration and running

time (r = -0.30, P<0.05) and a positive correlation between peak IL-6

concentration and running intensity (r = 0.32, P<0.05). The IL-1 receptor

antagonist (IL-1ra) plasma concentration peaked 1.5 h after the run and

there was a positive correlation between the peak plasma concentrations of

1L-6 and \*\*\*1L\*\*\* - \*\*\*1ra\*\*\* ( \*\*\*r\*\*\* = 0.39, P<0.01). Creatine

kinase (CK) plasma concentration peaked on the 1st day after the

no association was found between peak concentrations of IL-6 and CK In

conclusion, the results confirmed the hypothesized association

plasma IL-6 concentration and running intensity, but did not confirm the

previous finding of a connection between IL-6 plasma concentration and

muscle damage.

L2 ANSWER 2 OF 14 MEDLINE

AN 97225342 MEDLINE

DN 97225342 PubMed ID: 9071715

TI Lipopolysaccharide-binding protein and

bactericidal/permeability-

increasing factor during hemodialysis: clinical determinants and role of

different membranes.

AU Sundaram S; King A J; Pereira B J

CS Division of Nephrology, New England Medical Center, Boston, Massachusetts

02111, USA.

NC DK 45609 (NIDDK)

SO JOURNAL OF THE AMERICAN SOCIETY OF

NEPHROLOGY, (1997 Mar) 8 (3) 463-70.

Journal code: 9013836. ISSN: 1046-6673.

CY United States

DT Journal; Article; (JOURNAL ARTICLE)

LA English

FS Priority Journals

EM 199706 ED Entered STN: 19970620

Last Updated on STN: 19970620

Entered Medline: 19970611

AB The host response to the presence of lipopolysaccharide (LPS) is complex

and varied. Two closely related endogenous serum proteins,

LPS-binding

protein (LBP) and bactericidal/permeability-increasing factor (BPI),

regulate delivery of LPS to CD14 antigen on effector cell surfaces

modulate the host response to LPS. In the study presented here, plasma

levels of LBP and BPI were measured, predialysis, 15 min into dialysis and

postdialysis in patients dialyzed with cellulose,

cellulose-tri-acetate

(CTA), and polysulfone dialyzers. Further, the association between LBP

levels and BPI release during hemodialysis and clinical and laboratory

characteristics of patients, complement activation represented by plasma

C3a levels, and monocyte cytokine production represented by interleukin-l

receptor antagonist (IL-1Ra) synthesis was also studied. Predialysis

plasma levels of LBP were 14,459 +/- 544, 13,889 +/- 1362 and 12.622 +/-

6305 ng/mL, respectively, with cellulose, CTA, and polysulfone dialyzers.

and postdialysis levels were 17,834 +/- 861, 20,979 +/- 8485 and 18,177

+/- 1656 ng/mL, respectively. Postdialysis plasma levels of LBP

consistently higher than predialysis levels with all three dialyzers (P <

0.05). However, plasma LBP levels were not significantly different between

the three dialyzers either predialysis (P = 0.28) or postdialysis (P

2.8). There were no significant differences in predialysis BPI levels

between the three dialyzers (P = 0.21). BPI levels at 15 min of

2.24 ng/mL) DT Journal; Article; (JOURNAL ARTICLE) dialyzers were significantly greater (P < 0.05) than that observed LA German FS Priority Journals cellulose (5.49 +/- 0.66 ng/mL). Similarly, postdialysis levels EM 199611 ED Entered STN: 19961219 with CTA and polysulfone were significantly greater (P  $\leq$  0.05) than that Last Updated on STN: 20000303 Entered Medline: 19961114 with cellulose dialyzers. The percentage change in BPI levels AB OBJECTIVE: To determine whether the activity of cartilage-degrading between enzymes in the synovial fluid (SF) of patients with rheumatoid predialysis and 15 min was 1341 +/- 243%, 2935 +/- 1033%, and 3790 +/arthritis and other joint diseases is correlated with the concentration of 1151% for cellulose, CTA, and polysulfone dialyzers, respectively. The cvtokines in the SF. METHODS: Cytokines and cartilage-degrading changes in BPI levels from predialysis to 15 min and between preenzymes were postdialysis samples were statistically significant for all three determined in the SF of 97 patients with various disorders dialyzers (P < 0.05). Postdialysis LBP:BPI ratios were 50 +/- 6%, involving the knee joints (rheumatoid arthritis (RA) n 44; osteoarthritis (OA) n 4%, and 22 +/- 6% of predialysis ratios for cellulose, CTA, and meniscal trauma (Men) n 10; reactive arthritides (ReA) n 8). In polysulfone dialyzers, respectively. These changes were these significant (P < 0.05) for all three dialyzers. There was no samples we measured the concentrations of interleukin-1 alpha and beta, significant IL-1-receptor antagonist (IL-1ra), IL-6, IL-8, tumor necrosis correlation between baseline clinical or laboratory characteristics factor alpha (TNF alpha; all by ELISA), collagenase-activity and predialysis LBP levels. Similarly, the correlation between BPI caseinase-activity (by levels at substrate assays). RESULTS: With the exception of IL-1 alpha 15 min of dialysis with the clinical and laboratory characteristics and IL-6. was also poor, with the exception of serum albumin (r = 0.43, P = cytokine-concentrations were significantly higher in RA than in OA 0.008). The correlation between BPI levels at 15 min of dialysis with plasma SF-samples (p < 0.05; ANOVA on ranks). IL-1ra, IL-6, and IL-1 LBP beta were levels (r = -0.29; P = 0.08), plasma C3a levels (r = -0.1; P =correlated best with the collagenase-activity in the SF (r = 0.63); 0.55),0.57: peripheral blood mononuclear cells (PBMC) content of \*\*\*IL\*\*\* 0.55; Spearman's rank correlation), while IL-1 beta (r = 0.53) and \*\*\*IL\*\*\* - \*\*\*1ra\*\*\* ( \*\*\*r\*\*\* = 0.52) were best correlated \*\*\*1Ra\*\*\* ( \*\*\*r\*\*\* = 0.01; P = 0.94), and IL-1Ra with production by the caseinase-activity in the samples. The SF-concentration of unstimulated (r = 0.13; P = 0.45), and endotoxin-stimulated PBMC (r =well correlated with the levels of IL-6, IL-1 beta, II-8, and TNF 0.32, P = 0.06) was not statistically significant. The results of this alpha (r from 0.73 to 0.66; all p < 0.005), but not with IL1 alpha. The study demonstrate that dialysis with cellulose, CTA, and polysulfone molar ratio of IL-1 to IL-1ra in the SF was neither correlated with the activity dialyzers results in a significant increase in LBP and BPI levels. RPI collagenase nor caseinase. IL-1 beta and IL-1ra in the SF were release is probably mediated by non-complement factors and may positively be related correlated with the erythrocyte sedimentation rate (ESR). to the nutritional status of the patient. The release of BPI during CONCLUSIONS: The consequent lowering of the LBP:BPI ratio could potentially afford determination of IL-1 beta and IL-1ra in the SF of patients with some protection against endotoxin in the dialysate. disorders as examined in this study seems to allow to a certain prediction of the collagenase- and caseinase-activity contained in L2 ANSWER 3 OF 14 MEDLINE the AN 96416422 MEDLINE DN 96416422 PubMed ID: 8928570 diseased joint. We would favor. TI [Practical significance of cytokine determination in joint fluid in L2 ANSWER 4 OF 14 MEDLINE patients with arthroses or rheumatoid arthritis]. AN 96188960 MEDLINE Praktische Bedeutung der Zytokinbestimmung im Gelenkpunktat DN 96188960 PubMed ID: 8608647 von Patienten mit Arthrosen oder rheumatischen Arthritiden. TI Significance of IL-1beta and IL-1 receptor antagonist (IL-1Ra) AU Neidel J; Schulze M; Sova L; Lindschau J CS Abt. fur Orthopadie, Rheumaklinik Bad Bramstedt, bronchoalveolar lavage fluid (BALF) in patients with diffuse panbronchiolitis (DPB). Medizinische Hochschule AU Kadota J, Matsubara Y, Ishimatsu Y, Ashida M, Abe K, Shirai Hannover. SO ZEITSCHRIFT FUR ORTHOPADIE UND IHRE R: Iida K: GRENZGEBIETE, (1996 Jul-Aug) 134 (4) Kawakami K; Taniguchi H; Fujii T; Kaseda M; Kawamoto S;

Kohno S

dialysis

with CTA (10.91 +/- 3.65 ng/mL) and polysulfone (10.73 +/-

Journal code: 1256465. ISSN: 0044-3220.

CY GERMANY: Germany, Federal Republic of

CS Second Department of Internal Medicine, Nagasaki University School of Medicine, Japan. SO CLINICAL AND EXPERIMENTAL IMMUNOLOGY, (1996 Mar) 103 (3) 461-6. Journal code: 0057202. ISSN: 0009-9104. CY ENGLAND: United Kingdom DT Journal; Article; (JOURNAL ARTICLE) LA English FS Priority Journals EM 199605 ED Entered STN: 19960605 Last Updated on STN: 19960605 Entered Medline: 19960528 AB We evaluated the effect of erythromycin therapy on pulmonary function tests and the airway inflammatory response of patients with DPB. The number of neutrophils in BALF obtained from DPB patients was significantly higher than that of healthy volunteers. Treatment with erythromycin (600 mg/day for 12.9+/-9.5 months (mean +/- s.d.)) significantly reduced the total number of cells and neutrophils in the airway, and significantly improved pulmonary function tests. The levels of IL-1beta and IL-8 were significantly higher in DPB compared with healthy volunteers (P<0.05. P<0.05, respectively). IL-1Ra in patients is considered to have a weak inhibitory activity for IL-1beta, with approximately five-fold concentration of IL-1beta compared with that in healthy volunteers (approx. nine-fold concentration of IL-1beta). Erythromycin therapy significantly reduced these cytokines to levels comparable to those healthy volunteers, and produced a trend toward reduction in the IL-1Ra in BALF. The level of IL-1beta correlated significantly with the concentration of neutrophils in BALF (r=0.72, P<0.01), as well as with the level of \*\*\*IL\*\*\* - \*\*\*1Ra\*\*\* ( \*\*\*r\*\*\* =0.688, P<0.05) and IL-8 (r=0.653, P<0.05). A nearly significant or significant correlation was observed between the concentration of neutrophils and levels of IL-1Ra or 1L-8 in BALF (r=0.526, P=0.053 or r=0.776, P<0.01, respectively). There

was also a significant relationship between FEV(1) and the of neutrophils in BALF (r=0.524, P<0.05). Our results suggest that the relative amounts of IL-1beta and IL-1Ra or IL-8 may contribute, at least in part, to the neutrophil-mediated chronic airway inflammation in patients with chronic airway disease, and long-term erythromycin may down-regulate the vigorous cycle between the cytokine network and neutrophil accumulation, with resultant reduction of neutrophil-mediated inflammatory response.

L2 ANSWER 5 OF 14 MEDLINE AN 95189896 MEDLINE

DN 95189896 PubMed ID: 7883859

TI Soluble cytokine receptors and the low 3,5,3'-triiodothyronine syndrome in patients with nonthyroidal disease. AU Boelen A; Platvoet-Ter Schiphorst M C; Wiersinga W M CS Department of Endocrinology, University of Amsterdam, The Netherlands. SO JOURNAL OF CLINICAL ENDOCRINOLOGY AND METABOLISM, (1995 Mar) 80 (3) 971-6. Journal code: 0375362. ISSN: 0021-972X. CY United States DT Journal; Article; (JOURNAL ARTICLE) LA English FS Abridged Index Medicus Journals; Priority Journals EM 199504 ED Entered STN: 19950425 Last Updated on STN: 19950425 Entered Medline: 19950411 AB Cytokines have been implicated in the pathogenesis of the low during illness. This is supported by our recent observation of a strong negative relationship between serum T3 and serum interleukin-6 (IL-6) in nonthyroidal illness (NTI). In the last few years, soluble cytokine receptors and cytokine receptor antagonists have been discovered serum. These proteins have the potential to further regulate cytokine activity. Therefore, we now studied the association between serum serum levels of soluble tumor necrosis factor-alpha (sTNF alpha R p55 and sTNF alpha R p75), soluble interleukin-2 receptor (s1L-2R), and interleukin-1 receptor antagonist (IL-1RA) in 100 consecutive hospital admissions with a wide variety of nonthyroidal diseases. Patients divided into group A (T3, > or = 1.30 nmol/L; T4, > or = 75 41), group B (T3, < 1.30 nmol/L; T4, > or = 75 nmol/L; n = 46), and group C(T3, < 1.30 nmol/L; T4, < 75 nmol/L; n = 13). Serum sTNFalpha R p55, sTNF alpha R p75, sIL-2R, and IL-1RA were lower in group A than in groups B and C [median values; sTNF alpha R p55, 1.25, 2.25, and 3.55 ng/mL (P <0.001); sTNF alpha R p75, 2.02, 4.56, and 7.00 ng/mL (P  $\leq$ 0.001); sIL-2R. 184, 259, and 272 U/mL (P = 0.0004), respectively]. Serum IL-1RA levels were not different in the three groups (median values, 122, 193, and 258 pg/mL, respectively). Taking all patients together, a significant negative relation was found among serum T3 and sTNF alpha p55 (r = -0.59; P < 0.0001), sTNF alpha R p75 (r = -0.55; P < 0.0001), sIL-2R (r =-0.54: P < 0.0001), \*\*\*IL\*\*\* - \*\*\*1RA\*\*\* ( \*\*\*r\*\*\* = -0.38; P = 0.001), and IL-6 (r = -0.56; P < 0.0001). A remarkable high correlation (r =-0.70; P < 0.0001) was found between serum T3 and a newly designed total score based on the summation of serum levels of IL-6 and the four soluble

cytokine receptor proteins. IL-6 and the four cytokine receptor

were all significantly related to each other. Stepwise multiple

proteins

underlying regression indicated IL-6 and sTNF alpha R p75 as independent leukocyte activation in this disorder. The increased cytokine determinants of T3 concentration may also be responsible for the endothelial adhesion [serum T3 = 2.09-0.32ln (sTNF alpha R p75) -0.15ln (IL-6); r = 0.70]. The accompanies preeclampsia. variability in serum T3 was accounted for 35% by changes in In L2 ANSWER 7 OF 14 CAPLUS COPYRIGHT 2002 ACS (sTNF alpha R p75) and 14% by changes in ln (IL-6).(ABSTRACT AN 2001:435130 CAPLUS TRUNCATED AT 400 WORDS) DN 135:41824 TI DNA encoding human and murine \*\*\*interleukin\*\*\* -\*\*\*|\*\*\* L2 ANSWER 6 OF 14 MEDLINE AN 95060548 MEDLINE \*\*\*receptor\*\*\* \*\*\*antagonist\*\*\* - \*\*\*related\*\*\* molecules DN 95060548 PubMed ID: 7526306 IN Saris, Christian M.; Giles, Jennifer, Mu, Sharon X.; Xia, Min; TI Increased concentrations of cytokines interleukin-6 and Bass, interleukin-1 Michael Brian; Craveiro, Roger PA Amgen, Inc., USA receptor antagonist in plasma of women with preeclampsia: a SO PCT Int. Appl., 190 pp. mechanism for endothelial dysfunction?. CODEN: PIXXD2 AU Greer I A; Lyall F; Perera T; Boswell F; Macara L M DT Patent CS Department of Obstetrics and Gynecology, Royal Infirmary, LA English FAN.CNT I APPLICATION NO. Scotland, United Kingdom. PATENT NO. KIND DATE SO OBSTETRICS AND GYNECOLOGY, (1994 Dec) 84 (6) DATE Journal code: 0401101. ISSN: 0029-7844. PI WO 2001042304 A1 20010614 WO 2000-US32940 20001204 CY United States DT Journal; Article; (JOURNAL ARTICLE) W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, LA English CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, FS Abridged Index Medicus Journals; Priority Journals EM 199412 GH, GM, HR, ED Entered STN: 19950110 HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, Last Updated on STN: 19960129 LS, LT, Entered Medline: 19941213 LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, AB OBJECTIVE: To determine if plasma concentrations of defined PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, cytokines are UZ, VN,
YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM increased in women with preeclampsia, and to correlate any increases with the elevated concentrations of the vascular cell adhesion molecule RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, (VCAM)-1. METHODS: Twenty primigravidas with AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, preeclampsia were compared to 20 healthy primigravidas. Plasma levels of cytokines, tumor TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, necrosis factor-alpha (TNF alpha), interleukin (IL)-6, IL-8, IL-1 beta, IL-1 TG PRAI US 1999-170191P P 19991210 receptor antagonist (IL-1ra), granulocyte macrophage-colony-stimulating US 2000-188053P P 20000309 factor (GM-CSF), and VCAM-1, were measured by US 2000-194521P P 20000404 enzyme-linked immunosorbent US 2000-195910P P 20000410 assay. RESULTS: Concentrations of IL-6 and IL-1ra were AB The present invention provides nucleic acid mols, encoding significantly higher (P < .01) in preeclamptic women (2.56 and 251.85 pg/mL, \*\*\*Antagonist\*\*\* respectively) compared to normal pregnant patients (2.06 and \*\*\*Related\*\*\* ( \*\*\*IL\*\*\* - \*\*\*1ra\*\*\* - \*\*\*R\*\*\* ) 142.00 pg/mL. polypeptides. respectively). There were no significant changes in concentrations The cDNAs encoding human and murine \*\*\*IL\*\*\* - \*\*\*1ra\*\*\* of TNF \*\*\*R\*\*\* alpha, IL-8, GM-CSF, and IL-1 beta in preeclamptic patients (14.09, 50.52, were cloned and the expression in several human tissues were 125.8, and 2.08 pg/mL, respectively) compared to normal patients examd, by either RT-PCR or in situ hybridization. \*\*\*IL\*\*\* - \*\*\*1ra\*\*\* (11.96)44.46, 121.3, and 2.01 pg/mL, respectively). Serum \*\*\*R\*\*\* was expressed in E. coli and mammalian cell and anticoncentrations of \*\*\*IL\*\*\* VCAM-1 were increased in women with preeclampsia - \*\*\*1ra\*\*\* - \*\*\*R\*\*\* antibody was produced. The biol. (preeclamptic group 841.9 +/-49.7 ng/mL, control group 560.2 +/-47.9 ng/mL; t = 3.673, P activity of \*\*\*IL\*\*\* - \*\*\*1ra\*\*\* - \*\*\*R\*\*\* was assessed in transgenic Interleukin-6 and IL-1ra concentrations correlated with VCAM-1 mice. The concentrations (IL-6: r = 0.539, z = 2.9, P < .005; \*\*\*IL\*\*\* invention also provides selective binding agents, vectors, host \*\*\*1ra\*\*\* : \*\*\*r\*\*\* = 0.451, z = 2.428, P < .02). methods for producing \*\*\*IL\*\*\* - \*\*\*1ra\*\*\* - \*\*\*R\*\*\* CONCLUSIONS: Increased cytokine concentrations may contribute to the polypeptides.

The invention further provides pharmaceutical compns. and

methods for the

endothelial damage

that occurs with preeclampsia and may explain the mechanism

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diagnosis, treatment, amelioration, and/or prevention of diseases.
   disorders, and conditions assocd with ***IL*** - ***1ra***
     ***R*** polypeptides.
RE.CNT 6 THERE ARE 6 CITED REFERENCES
AVAILABLE FOR THIS RECORD
         ALL CITATIONS AVAILABLE IN THE RE FORMAT
L2 ANSWER 8 OF 14 CAPLUS COPYRIGHT 2002 ACS
AN 1996:259086 CAPLUS
DN 124:331889
TI Significance of IL-1.beta, and IL-1 receptor antagonist (IL-1Ra)
   bronchoalveolar lavage fluid (BALF) in patients with diffuse
   panbronchiolitis (DPB)
AU Kadota, J.; Matsubara, Y.; Ishimatsu, Y.; Ashida, M.; Abe, K.;
Shirai, R.;
   Iida, K.; Kawakami, K.; Taniguchi, H.; et al.
CS School Medicine, Nagasaki University, Nagasaki, 852, Japan
SO Clin. Exp. Immunol. (1996), 103(3), 461-6
   CODEN: CEXIAL; ISSN: 0009-9104
DT Journal
LA English
AB We evaluated the effect of erythromycin therapy on pulmonary
function
   tests and the airway inflammatory response of patients with DPB.
The no.
   of neutrophils in BALF obtained from DPB patients was
significantly higher
   than that of healthy volunteers. Treatment with erythromycin
(600 mg/day
   for 12.sum.9.+-.9.sum.5 mo (mean .+-. s.d.)) significantly reduced
the
   total no. of cells and neutrophils in the airway, and significantly
   improved pulmonary function tests. The levels of IL-1.beta. and
IL-8 were
   significantly higher in DPB compared with healthy volunteers (P
   0.sum.05, P < 0.sum.05, resp.). IL-1Ra in patients is considered
to have
   a weak inhibitory activity for IL-1.beta., with approx. five-fold
   of IL-1.beta. compared with that in healthy volunteers (approx.
nine-fold
   concn. of IL-1.beta.). Erythromycin therapy significantly reduced
   cytokines to levels comparable to those of healthy volunteers, and
   produced a trend toward redn. in the level of IL-1Ra in BALF.
The level
   of IL-1.beta. correlated significantly with the concn. of neutrophils
   BALF (r = 0.72, P < 0.01), as well as with the level of ***IL***
    ***1Ra*** ( ***r*** = 0.688, P < 0.05) and IL-8 (r = 0.653,
P <
   0.05). A nearly significant or significant correlation was obsd.
between
   the concn. of neutrophils and levels of IL-1Ra or IL-8 in BALF (r
= 0.526.
   P = 0.053 or r = 0.776, P < 0.01, resp.). There was also a
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relation between FEV1 and the concn. of neutrophils in BALF (r

< 0.05). Our results suggest that the relative amts. of IL-1.beta.

neutrophil-mediated chronic airway inflammation in patients with

IL-1Ra or IL-8 may contribute, at least in part, to the

airway disease, and long-term erythromycin therapy may

vigorous cycle between the cytokine network and neutrophil

significant

= 0.524, P

down-regulate the

accumulation.

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with resultant redn, of neutrophil-mediated inflammatory
L2 ANSWER 9 OF 14 CAPLUS COPYRIGHT 2002 ACS
AN 1995:437486 CAPLUS
TI Soluble cytokine receptors and the low 3,5,3'-triiodothyronine
syndrome in
   patients with nonthyroidal disease
AU Boelen, A.; Schiphorst, M. C. Platvoet-ter; Wiersinga, W. M.
CS Department of Endocrinology, Univ. of Amsterdam,
Amsterdam, Neth.
SO J. Clin. Endocrinol. Metab. (1995), 80(3), 971-6
   CODEN: JCEMAZ; ISSN: 0021-972X
DT Journal
LA English
AB Cytokines have been implicated in the pathogenesis of the low
   during illness. This is supported by our recent observation of a
strong
   neg. relationship between serum Tc and serum interleukin-6
(IL-6) in
   nonthyroidal illness (NTI). In the last few years, sol. cytokine
   receptors and cytokine receptor antagonists have been discovered
in human
  serum. These proteins have the potential to further regulate
cytokine
   activity. Therefore, we now studied the assocn. between serum T3
   serum levels of sol. tumor necrosis factor-.alpha, receptors
(sTNF.alpha.R
   p55 and sTNF.alpha.R p75), solbule interleukin-2 receptor
(sIL-2R), and
   the interleukin-1 receptor antagonist (IL-1RA) in 100 consecutive
  admissions with a wide variety of nonthyroidal diseases. Patients
were
   divided into group A (T3, .gtoreq.1.30 nmol/L; T4, .gtoreq.75
nmol/L: n
   41), group B (T3, <1.30 \text{ nmol/L}; T4, .gtoreq.75 nmol/L; n = 46),
and group
   C (T3, <1.30 \text{ nmol/L}; T4, <75 \text{ nmol/L}; n = 13). Serum
sTNF.alpha.R p55,
   sTNF.alpha.R p75, sIL-2R, and IL-1RA were lower in group A
than in groups
   B and C [median values: sTNF.alpha.R p55, 1.26, 2.25, and 3.55
ng/mL(P <
   0.001); sTNF.alpha.R p75, 2.02, 4.56, and 7.00 ng/mL (P <
0.001); sIL-2R,
   184, 259, and 272 U/mL (P = 0.0004), resp.]. Serum IL-1RA
levels were not
   different in the three groups (median values, 122, 193, and 258
   resp.). Taking all patients together, a significant neg. relation was
   found among serum T3 and sTNF.alpha. p55 (r = -0.59; P <
0.0001),
   sTNR.alpha.R p75 (r = -0.55; P < 0.0001), sIL-2R (r = -0.54; P < 0.0001)
0.0001).
    ***IL*** - ***1RA*** ( ***r*** = -0.38; P = 0.001), and
IL-6 (r =
   -0.56; P < 0.0001). A remarkable high correlation (r = -0.70; P <
0.0001)
   was found between serum T3 and a newly designed total score
based on the
  summation of serum levels of IL-6 and the four sol. cytokine
   proteins. IL-6 and the four cytokine receptor proteins were all
   significantly related to each other. Stepwise multiple regression
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indicated IL-6 and sTNF.alpha.R p75 as independent

[serum T3 =  $2.09 - 0.32 \ln (sTNF.alpha.R p75) - 0.15 \ln (IL-6); r$ 

determinants of T3

= 0.701.

ln (sTNF.alpha.R p75) and 14% by changes in ln (IL-6). In conclusion, 1) serum T3 is neg. related to serum sTNF.alpha.R p55, sTNF.alpha.R p75 sIL-2R, IL-1RA, and IL-6 in patients; and 2) sTNF.alpha.R p75 independent determinants of serum T3 in NTI, accounting for 35% and 14%. resp., of the variability in T3. The results suggest that the sick euthyroid syndrome is part of the acute phase response during generated by activation of the cytokine network. L2 ANSWER 10 OF 14 USPATFULL AN 2002:5759 USPATFULL TI Interleukin-1 receptor antagonist and recombinant production thereof Ford, John, San Mateo, CA, United States Pace, Ann, Scotts Valley, CA, United States PA Hyseq, Inc., Sunnyvale, CA, United States (U.S. corporation) US 6337072 B1 20020108 US 1999-348942 19990707 (9) RLI Continuation-in-part of Ser. No. US 1999-287210, filed on 5 now abandoned Continuation-in-part of Ser. No. US 1999-251370, filed on 17 Feb 1999, now abandoned Continuation-in-part of Ser. No. 1999-229591, filed on 13 Jan 1999, now abandoned Continuation-in-part of Ser. No. US 1998-127698, filed on 31 Jul 1998, now abandoned Continuation of Ser. No. US 1998-99818, filed on 19 Jun 1998, abandoned Continuation of Ser. No. US 1998-82364, filed on 20 May 1998. now abandoned Continuation-in-part of Ser. No. US 1998-79909, filed on 15 May 1998, now abandoned Continuation-in-part of Ser. No. 1998-55010, filed on 3 Apr 1998, now abandoned PRAI WO 1999-US4291 19990405 DT Utility FS GRANTED EXNAM Primary Examiner: Spector, Lorraine LREP Marshall, O'Toole, Gerstein, Murray & Borun CLMN Number of Claims: 37 ECL Exemplary Claim: 1.15 DRWN 4 Drawing Figure(s); 4 Drawing Page(s) LN.CNT 5025 CAS INDEXING IS AVAILABLE FOR THIS PATENT. The present invention provides novel nucleic acids, the novel polypeptide sequences encoded by these nucleic acids and uses thereof.

The variability in serum T3 was accounted for 35% by changes in

These novel polynucleotide and polypeptide sequences were determined to be a novel Interleukin-1 Receptor Antagonist.

L2 ANSWER 11 OF 14 USPATFULL AN 2001:163320 USPATFULL

TI Anti-interleukin-1 receptor antagonist antibodies and uses thereof

Ford, John, San Mateo, CA, United States IN Pace, Ann, Scotts Valley, CA, United States

PA Hyseq, Inc., Sunnyvale, CA, United States (U.S. corporation)

B1 20010925 PΙ US 6294655

US 1999-417455 19991013 (9)

RLI Continuation-in-part of Ser. No. US 1999-348942, filed on 7

Continuation of Ser. No. US 1999-287210, filed on 5 Apr 1999,

abandoned Continuation-in-part of Ser. No. US 1999-251370, filed on 17

Feb 1999, now abandoned Continuation-in-part of Ser. No. US 1998-127698.

filed on 31 Jul 1998, now abandoned Continuation-in-part of Ser. No. US

1999-229591, filed on 13 Jan 1999, now abandoned Continuation of Ser.

No. US 1998-99818, filed on 19 Jun 1998, now abandoned, said Ser. No.

US 127698 Continuation-in-part of Ser. No. US 1998-82364, filed on 20

May 1998, now abandoned, said Ser. No. US 99818 Continuation-in-part of

Ser. No. US 1998-82364, filed on 20 May 1998, now abandoned

Continuation-in-part of Ser. No. US 1998-79909, filed on 15 May 1998,

now abandoned Continuation-in-part of Ser. No. US

1998-55010, filed on 3

Apr 1998, now abandoned

Utility

FS GRANTED

EXNAM Primary Examiner: Spector, Lorraine

LREP Marshall, O'Toole Gerstein, Murray & Borun

CLMN Number of Claims: 14

ECL Exemplary Claim: 1

DRWN 15 Drawing Figure(s); 14 Drawing Page(s)

LN.CNT 4656

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

The present invention provides novel nucleic acids, the novel polypeptide sequences encoded by these nucleic acids and uses thereof.

These novel polynucleotide and polypeptide sequences were determined to

be a novel Interleukin-1 Receptor Antagonist. Also provided are antibodies which bind the antagonist, methods of detecting the antagonist, and kits containing the antibodies.

L2 ANSWER 12 OF 14 USPATFULL

AN 1999:132765 USPATFULL

TI Method of treatment of osteoarthritis with interleuken-1 receptor

antagonist

Pelletier, Jean-Pierre, St-Lambert, Canada Martel-Pelletier, Johanne, St-Lambert, Canada

Arthro Lab Inc., Sherbrooke, Canada (non-U.S. corporation)

ΡĮ US 5972880 19991026 19960307 (8)

US 1996-612433 DT Utility

Granted FS

EXNAM Primary Examiner: Mertz, Prema

LREP ROBIC

CLMN Number of Claims: 3

ECL Exemplary Claim: 1

DRWN 2 Drawing Figure(s); 2 Drawing Page(s)

**LN.CNT 745** 

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

A method and a composition for the preventative treatment of osteoarthritis comprising the periodic administration to a mammal

suffering of this disease of a composition comprising an amount

recombinant Interleukin-1 receptor antagonist effective for reducing the

progression of lesions and cartilage degradation.